

## SOIL EROSION AND SEDIMENT CONTROL (ESC) PLAN

### CHECKLIST REQUIRED COMPONENTS

Plan Requirements	Sheet #	YES/NO
Confirm there is a title indicating the plan is a ESC sheet. [21 DCMR § 542.9 (a)]		
Confirm there is a project narrative. [21 DCMR § 542.9 (b)]		
Confirm the names, addresses, and contact information for property owner, developer and plan designer are included. [21 DCMR § 542.9 (c/e)]		
Confirm the lot, square, or parcel numbers are identified. [21 DCMR § 542.9 (d)]		
Confirm there is a vicinity sketch that includes a north arrow, scale, and other information necessary to locate the property? [21 DCMR § 542.9 (g)]		
Circle the plan horizontal scale used OR, approve an alternate: 1 in. = 10 ft; 1 in. = 20 ft; 1 in. = 30 ft; 1 in. = 40 ft; 1 in. = 50 ft; or 1 in. = 80 ft. ALTERNATE [21 DCMR § 542.9 (h)]		
Circle plan vertical scale used OR, approve an alternate: 1 in. = 2 ft; 1 in. = 4 ft; 1 in. = 5 ft; or 1 in. = 10 ft. ALTERNATE [21 DCMR § 542.9 (i)]		
Are there existing features such as vegetation, wildlife habitat, water areas, and topsoil conditions identified on the ESC plan? [21 DCMR § 542.9 (j)]		
Confirm the above features are discussed in the erosion prevention plan notes? [21 DCMR § 542.9 (j)]		
Has the existing and proposed topography been clearly identified? [21 DCMR § 542.9 (k)]		
Have all areas (existing and proposed) with slopes greater than fifteen percent (15%) been clearly identified? If yes, add note to avoid work on slopes greater than fifteen percent (15%). [21 DCMR § 542.9 (k); 543.11]		
Will site work be done on slopes greater than fifteen percent (15%)?		
<i>If YES, require the seal and signature of a DC- licensed PE.</i> [21 DCMR § 542.9(f); 543.11]		

Plan Requirements	Sheet #	YES/ NO
Does the disturbance and grading plan identify the limits of disturbance and the surface area within those limits (LOD)? [21 DCMR § 542.9(l.1)]		
Is the volume of spoil material (excavation), and the volume of borrow material (fill) identified based on the disturbance and grading plan? [21 DCMR § 542.9(l.2/3)]		
The ESC plan must include a general description of the predominant soil types on the site, as described by the appropriate soil survey information available from the USDA-NRCS. [21 DCMR § 542.9(q)]		
If there are unstable soils the ESC plan must include recommendations for areas with unstable soils from a <i>DC- licensed PE</i> . [21 DCMR § 542.9(r)]		
Have storm flows (based on velocities and quantities) been routed through areas with erosion and a sediment control measure to an approved point of discharge through the installation of lined conveyance ditches, channels, or check dams? [21 DCMR § 542.9(m)]		
If a site's land disturbance is 5,000 square feet or more, but does not disturb one acre, the ESC plan must contain a Stormwater Pollution Prevention Plan (SWPPP) comprised of "good housekeeping notes" from Appendix Q of the District's 2013 Stormwater Management Guidebook. [21 DCMR § 543.10(a/b)]		
Have site conditions around the site's surface water discharge points been identified? [21 DCMR § 542.9(m.1)]		
Are there details of grading practices that will be used on the site to minimize on-site erosion and prevent off-site sedimentation? [21 DCMR § 542.9(n)]		
Does the project narrative specify how it will ensure land disturbance does not extend beyond the proposed area of disturbance? [21 DCMR § 542.9(n.1)]		
Are there details and notes on methods to minimize off-site vehicle tracking of sediment and generation of dust? [21 DCMR § 542.9(n.3)]		
Are there design details for structural control measures? These must be shown on the ESC plan view indicating the size and location of each control measure. [21 DCMR § 542.9(n.4)]		

Plan Requirements	Sheet #	YES/ NO
Are the design details for ESC measures consistent with District Standards and Specifications for Soil Erosion and Sediment Control? [21 DCMR § 542.9(n.4)]		
If waterway crossing and stream banks are identified in the project area, location and size of protection measures are indicated on the ESC plan along with design details and constructions notes from the District's Standards and Specifications for Soil Erosion and Sediment Control. [21 DCMR § 543.4]		
ESC plan must demonstrate in narrative, plan view & details, measures to prevent the discharge of erodible or waste material (including off site transportation) to District sewers or waterbodies. [21 DCMR § 543.9]		
If above grade access roads are proposed include crushed stone dike detail. [21 DCMR § 542.9(n.4)]		
Is there a design detail for construction entrances for the construction project and for each access road? [21 DCMR § 542.9(n.4)]		
Are interim and permanent stabilization measure identified with notes and details for each stabilization measure? [21 DCMR § 542.9(o)]		
When proposed design contains paved areas the ESC plan must note these require permanent stabilization with base course crushed stone or other DDOE-approved measures. [21 DCMR § 543.8]		
All ESC plans must describe the sequence of construction. [21 DCMR § 543.8]		
<p>Sequence of Construction: describe implementation and maintenance of ESC measures; identify permanent and interim stabilization practices. Include stages or phases of earth disturbance and construction. It must cover,</p> <ol style="list-style-type: none"> <li>1. Clearing and grubbing required for perimeter controls;</li> <li>2. Construction of perimeter controls;</li> <li>3. Remaining clearing and grubbing;</li> <li>4. Road grading;</li> <li>5. Grading for the remainder of the site;</li> <li>6. Utility installation, including the use or blocking of storm drains after construction;</li> <li>7. Final grading, landscaping, or stabilization; and</li> <li>8. Removal of controls. [21 DCMR § 542.9 (p)]</li> </ol>		

Plan Requirements	Sheet #	NO
ESC notes must require maintenance of perimeter controls around active use stockpile material to protect against erosion. [21 DCMR § 543.16(a)]		
ESC notes must require the stabilization of inactive stockpile material with mulch, temporary vegetation, hydro-seed or plastic within fifteen (15) calendar days after its last use or addition. [21 DCMR § 543.16(b)]		
Sediment traps or basins and other erosion and sediment controls shall be installed <b>no later than the first phase of land grading</b> . [21 DCMR § 543.17(a)]		
Sediment traps or basins and other ESCs shall be, installed as soon as new site-related runoff is detected and employed <b>at all times</b> to protect inlets or storm sewers below silt-producing areas. [21 DCMR § 543.17(b/c)]		
<b>Immediately after</b> debris basins, diversions, waterways, and related structures are built seed and mulch, or install sod & stabilization blanket. [21 DCMR § 543.18]		
<b>No later than the first day</b> of construction install site access measures to minimize off-site vehicle tracking of sediments. Each construction entrance must be stabilized and include each additional measure required to keep sediment from being carried, onto public streets by construction vehicles, and washed into a storm drain or waterways. [21 DCMR § 543.19]		
Remove off-site accumulations of sediment <b>daily</b> during construction and <b>immediately</b> at the request of a DDOE inspector. [21 DCMR § 543.20 (a)]		
Perform <b>routine</b> maintenance to prevent any new destabilized areas. [21 DCMR § 543.20 (b)]		
Confirm the ESC plan contains a schedule, or statement block, with all the applicable notes from the “DDOE ESC General Notes”.		
Confirm the ESC a DC-licensed PE, LS, or Architect stamped plans. [21 DCMR § 542.13]		
When conducting underground utility work do not open more than five hundred linear feet (500 ft) of trench at any one time. [21 DCMR § 546.1(a)]		
Filter water pumped from excavations prior to discharging to the storm sewer system. [21 DCMR § 543.1]]		

Plan Requirements	Sheet #	NO
Utility work: place excavated material upslope of trench. [21 DCMR § 546.1(b)]		
Provide stabilization (interim or permanent) immediately after trench is refilled. [21 DCMR § 546.1(c)]		
Use mulch and matting on excavated material to minimize their erosion when natural or artificial grass filter strips are installed to receive stormwater runoff from the excavated materials. [21 DCMR § 546.1(d)]		
If the DDOE reviewer determines a cut and fill slope is likely to result in erosion from the site onto an adjacent property or a nearby waterbody, then the reviewer will require a DC-licensed geotechnical or civil engineer to design, based on site conditions, structural diversions that include vegetation or matting to protect the cut and fill slope. [21 DCMR § 543.15]		
A reviewer may approve an exception or modification to the buffer requirement for the conditions above but must require the behavior of a vegetated buffer be simulated. Standard soil erosion and sediment control measures will simulate buffer behavior during construction. Post construction the project must achieve a 1.7 inch Stormwater Retention Volume (SWRv) for the area of land disturbance within the buffer, calculated using the SWRv formula in chapter 2 of the District's Stormwater Management Guidebook, with a P equal to 1.7 through on-site retention or an approved combination of on-site and off-site retention. [21 DCMR § 543.15]		
A reviewer may grant relief for a portion of the 1.7 inch SWRv when on-site treatment is not feasible, and may approve alternatives to on-site treatment that will help to protect or restore the waterbody for which the buffer is intended, such as a down stream restoration project. This must be reflected on the plan submission. [21 DCMR § 545.6]		

Plan Requirements	Sheet #	NO
<i>Notes for Roadway Projects</i>		
Rough graded rights-of-way awaiting installation of utilities or pavement shall be protected by the installation of interceptor dikes across rights-of-way, with spacing of five hundred feet (500 ft) or less between dikes. A reviewer may approve alternative controls recommended a DC-licensed PE. [21 DCMR § 544.1]		
The ESC plan must demonstrate how temporary diversion dikes and flumes, or alternative controls recommended by a DC-licensed PE, will convey runoff down cut-and-fill slopes to an DDOE approved outlet. [21 DCMR § 544.2]		
The ESC plan must demonstrate how a permanent drainage structure, including diversions at top-of-slope cuts and diversions to convey runoff to a storm sewer or other suitable outlet, shall be installed at the completion of rough grading, unless the DDOE reviewer approves an alternative recommended by a DC-licensed PE. [21 DCMR § 544.3]		
<i>Notes for Building Demolition, Razing, and Site Development</i>		
Erosion shall be controlled by the installation of gutters and downspouts as soon as practicable. [21 DCMR § 545.1]		
Measures shall be taken to achieve a non-eroding velocity for stormwater exiting from a roof or downspout or to temporarily pipe that stormwater directly to a storm drain. [21 DCMR § 545.2]		
The site work shall maximize the preservation of natural vegetation and limit the removal of vegetation to what is necessary for construction or landscaping activity. [21 DCMR § 545.3]		
If site conditions preclude other means of erosion control, the DDOE reviewer may approve the installation of small dikes constructed along a low-lying perimeter area of a job site. [21 DCMR § 545.4]		